SQUEEZED: CURRENT CHALLENGES FOR SMALL CITRUS OPERATIONS

HEARING

BEFORE THE

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SQUEEZED: CURRENT CHALLENGES FOR SMALL CITRUS OPERATIONS

THURSDAY, JUNE 11, 2015

HOUSE OF REPRESENTATIVES,
COMMITTEE ON SMALL BUSINESS,
SUBCOMMITTEE ON AGRICULTURE, ENERGY AND TRADE,
Washington, DC.

The Subcommittee met, pursuant to call, at 10:02 a.m., in Room 2360, Rayburn House Office Building, Hon. Carlos Curbelo [chairman of the Subcommittee] presiding.

Present: Representatives Curbelo and Meng.

Also Present: Representatives Knight and Lawrence.

Chairman CURBELO. Good morning. I call this hearing to order.

This is my first hearing as chairman of the Subcommittee on Agricultural, Energy and Trade, and I look forward to working with Ranking Member Meng on issues of concern to small businesses.

The United States is one of the top procedures of citrus in the world. Florida, my home State, is the largest producing area, followed by California, Texas, and Arizona. Within these States, citrus is both economically and culturally significant. It fuels the economy, and for many growers and their families, it is a way of life passed down from one generation to another.

Citrus is a valuable United States crop. For the 2013 2014 season, its value was $3.39 billion, and a recent University of Florida study found that the total economic impact of the citrus industry in the State of Florida for fiscal year 2012/2013 was $10.68 billion. However, this United States economic powerhouse is facing significant challenges. The acreage and production of citrus are down, particularly in Florida, which is ground zero for a deadly bacterial disease that destroys citrus trees.

Huanglongbing, which is also referred to as HLB, or citrus greening, is a devastating citrus disease that has been found in Florida, Texas, and California. In addition, the insect that spreads HLB has been found in 15 States and United States territories. HLB, along with other current challenges, in particular the Mexican fruit fly in Texas, and the drought in California, are making it more difficult and costly to produce citrus. Faced with these challenges, small citrus growers, which comprise 90 percent of citrus farms and other small businesses in the citrus industry, are struggling to stay profitable and to stay in business.

Today we will be hearing from witnesses from Florida, California, and Texas who will explain how the current challenges are affecting small citrus growers and other businesses within the citrus industries in their States. I want to thank all the witnesses for

taking time away from their businesses and families, and for appearing before the Committee today.

With that, I yield to the ranking member, Ms. Meng, for her opening statement.

Ms. MENG. Good morning. I want to thank our Chairman Curbelo and his team for putting together such an important hearing. As a member from New York State, with, I am sure, a high consumption of citrus products, I am very excited to learn more about how the Federal Government can be of help towards our small businesses.

Agricultural remains a critical part in our Nation's economy, supporting more than 16 million jobs nationwide. American farmers are the best at what they do when given the opportunity to compete on an even playing field. However, the challenges farmers face are not limited to factors under their control. Unpredictable weather conditions and stubborn pests and disease wreak significant impacts on our producers' bottom line.

Many parts of the country are still suffering from persistent drought conditions. Pests and diseases are continuing to pose significant threats to plants and their respective industries, as we are witnessing with citrus greening. However, investments in agriculture research help mitigate these impacts, both environmentally and economically, and prepare producers for future adverse conditions. While the United States may not be the world's largest procedure of citrus, it plays a substantial role in producing citrus products sold domestically and abroad. Citrus exports in 2012 alone totaled over $1 billion, and the value of the 2013 to 2014 crop was estimated to be nearly $3.5 billion, proving the importance the industry plays in creating jobs and growing our Nation's economy.

But U.S. orange production forecast is down slightly due to projected production declines in Florida and California. This trend is largely due to citrus greening, a devastating disease caused by the Asian Citrus Psyllid. To date, there is no permanent solution to this horrible infestation that is slowly spreading across America's citrus groves. The entire citrus industry has taken a major blow since the disease was first identified. It has caused a loss of millions of boxes of oranges and thousands of acres of abandoned and tainted groves.

Citrus greening has taken a particularly hard toll on small citrus operations as they are more sensitive to the costs of the infestation. Such costs can include pesticides, quarantines, fertilizers, and replanting of trees. To make matters worse, those hardworking farmers face other challenges corresponding with citrus greening; droughts, freezes, hurricanes, port labor disputes, and other citrus pests.

The barriers to operating their business have become so cumbersome and financially burdensome that many smaller operations are questioning the future of the citrus industry. In fact, some smaller operations are struggling with the decision to keep hope alive for the citrus operations or throwing in the towel and planting new crops or selling land to developers. These decisions are troubling to many besides just the growers, as the industry supports jobs in the packing, trade, and grocery sectors. Because citrus operations generate jobs not only for themselves but for different

sectors of economy, addressing the challenges facing this industry will not only keep America producing jobs, but it will also continue to create jobs and gross domestic products in the future.

Today's hearing will give us the opportunity to learn more about the citrus industry in general, and what the future holds for them as we combat pests, disease, and climate issues. Though this issue is one concerning many stakeholders from local counties to numerous Federal agencies, we must hear from the small businesses on the front line of the issue. And today, we will do just that in hopes of finding ways to assist them in preserving the future of a quintessential fruit and breakfast drink. We are here today to learn more about what the Federal Government is doing to assist your small citrus businesses and what more is required. In order to ensure the success of our self-employed, we must understand the challenges facing this industry.

I thank all the witnesses for being here today, and I look forward to your comments.

Thank you, Mr. Chairman, and I yield back.

Chairman CURBELO. Thank you, Ms. Meng.

If additional committee members have an opening statement prepared, I ask that they be submitted for the record.

I would also like to take a moment to explain the timing lights for you. You will each have 5 minutes to deliver your testimony. The light will start out as green. When you have 1 minute remaining, the light will turn yellow. And, finally, it will turn red at the end of your 5 minutes.

I ask that you try to adhere to the time limit.

Our first witness is Kevin Severns, a second-generation navel orange grower. He is the owner of Severns Farms, a 40-acre citrus-growing operation in Sanger, California. Mr. Severns also serves as the general manager of the Orange Cove Sanger Citrus Association, a cooperative citrus packing house, and serves on the California Citrus Pest and Disease Prevention Committee. He is testifying on behalf of California Citrus Mutual, a trade association that represents California's citrus growers, and currently serves as the organization's chairman of the board.

Mr. Severns, thank you for being here today.

Next I am pleased to introduce a fellow Floridian, Larry Black. He is the general manager of Peace River Packing Company, a small citrus packing operation in Fort Meade, Florida, and a fifth-generation Florida citrus grower. Mr. Black is the current president of Florida Citrus Mutual, a trade association that represents the Florida citrus industry, and also serves on the board of the Citrus Research and Development Foundation. Previously he served as president of the Polk County Farm Bureau. He is testifying on behalf of Florida Citrus Mutual.

Mr. Black, thank you very much for being here today.

Our third witness is Dale Murden, the president of Texas Citrus Mutual, the grower association representing Texas citrus industry. He also owns and operates a cattle and citrus operation in the Lower Rio Grande Valley of Texas. This year, Mr. Murden became president of Texas Citrus Mutual. Previously he had managed Rio Farms, a unique nonprofit farming and agriculture operation for 25 years. Mr. Murden also currently serves as the executive director

of Texas Citrus Pest and Disease Management Association and has a long history of serving the Texas agriculture industry.

Mr. Murden, thank you very much for being here today.

I now yield to the ranking member for the introduction of our final witness.

Ms. MENG. It is my pleasure to introduce Dr. Michael Rogers, the interim center director and associate professor of entomology and nematology at the University of Florida's Citrus Research and Education Center. He is a preeminent scholar on citrus integrated pest management. He received his Ph.D. in entomology from the University of Kentucky, and his B.S. from Auburn University.

Welcome, Dr. Rogers.

Chairman CURBELO. We are pleased to have a distinguished panel of witnesses from the major citrus-producing States, and look forward to hearing from all of you.

Mr. Severns, you may begin.

STATEMENTS OF KEVIN SEVERNS, OWNER, SEVERNS FARM, ON BEHALF OF THE CALIFORNIA CITRUS MUTUAL; N. LARRY BLACK, JR., GENERAL MANAGER, PEACE RIVER PACKING COMPANY, ON BEHALF OF THE FLORIDA CITRUS MUTUAL; DALE MURDEN, PRESIDENT, TEXAS CITRUS MUTUAL; AND MICHAEL ROGERS, INTERIM DIRECTOR AND ASSOCIATE PROFESSOR, CITRUS RESEARCH AND EDUCATION CENTER, INSTITUTE OF FOOD AND AGRICULTURAL SCIENCES, UNIVERSITY OF FLORIDA

STATEMENT OF KEVIN SEVERNS

Mr. SEVERNS. Chairman Curbelo and Ranking Member Meng, thank you for the opportunity to testify today on the challenges that small citrus growers such as myself are facing.

Defining a small citrus grower is not easy. Years ago, a 40-acre citrus grower could make a reasonably good living. Today it probably takes 300 acres or more to stay in business farming citrus. Fifty years ago, growers did not have to deal with issues like good agricultural practices, GAAP audits, in other words, use reports, employee safety training, farm equipment emission certifications, and such as that. Today it is just part of the normal operations. Outside help and consultation is required, and it is not free. Please consider that California supplies 85 percent of the United States' fresh citrus, and has done so for nearly 150 years.

Today we have about 3,500 growers, about 100 packing houses, and probably 12,000 or more employees that work nearly year round. We sell citrus in 50 States and many countries worldwide. The major citrus-producing States represented here do what the other States cannot. We produce citrus fruits for the rest of the Nation and the world on a year-round basis. We must keep this vibrant industry healthy.

Not very long ago, California had 285,000 total acres. That number is more like 270,000 today, with more scheduled to be bulldozed this summer. The number of small citrus growers is significantly declining in California. It would appear that the small-scale citrus growers, and in a parallel sense, all citrus growers, might have a place on their own endangered species list. We have to consider the

possibility of no more U.S. citrus. We need to ask ourselves: Do we want a citrus industry? U.S.-grown citrus has a superb record as a healthy, safe, nutritious, and affordable product. Yet it could easily disappear from our store shelves. Invasive pests and diseases, drought, and misguided water policy, international trade issues, and the convergence of all of these have brought our industry into perilous times.

In California, we have watched Florida's decline in production due to huanglongbing, or HLB. For a citrus tree, HLB is a death sentence. In California we have the bug, the Asian Citrus Psyllid, what we refer to as the ACP, that spreads HLB, but so far no HLB. The task before us is to keep the ACP away from potentially infectious trees, and also to remove those trees before HLB can gain a foothold.

Through our industry-funded surveys, we found a single tree in southern California that tested positive for HLB. That tree was removed, and all citrus nearby continues to test negative for HLB. That tree had been grafted by a hobby gardener with illegally transported bud wood cut from an HLB-infected tree overseas. Such actions could easily destroy a $2.4 billion industry. And that is just in California.

We have appealed to residential citrus tree owners to work with us in watching for ACP and the disease. Controlling the ACP has been a challenge in the Los Angeles Basin. Most backyards in the area have citrus trees growing in them. San Joaquin Valley and the northern citrus-producing counties have had to deal with occasional small populations of ACP detections in some citrus groves. Growers are aggressive about treating detections, but doing is expensive.

Citrus trees can be infected with HLB for 2 or 3 years before beginning to decline. By quickly removing any tree that tests positive for HLB, we may buy time to give the industry researchers an opportunity to find a solution to the disease.

In September of 2011, the California Citrus Pest and Disease Prevention Committee, CPDPC, was formed to implement statewide suppression and eradication efforts. For the program, all California growers are assessed for every 40-pound carton produced. Over the past 5-plus years, $15 million has been collected annually to pay for the work of the CPDPC. The California Department of Food and Agriculture performs regulatory work trapping, testing, and treatment programs across the State on our behalf.

Jumping ahead to water, the drought and the water situation in California is beyond critical. While the lack of normal rainfall are disastrous, so are the misguided environmental policies affecting our State. Some growers are going into their second year of zero allocation of surface water. If available, the cost of water has gone from around $200 per acre foot to as much as $1,300 per acre foot. That is a 650 percent increase.

I see I am out of time. I will say that all of these issues, in addition to others, are converging in order to make it very difficult for the small citrus grower to continue to survive.

Thank you.

Chairman CURBELO. Thank you very much, Mr. Severns.

Mr. Black.

STATEMENT OF N. LARRY BLACK

Mr. BLACK. Chairman Curbelo and Ranking Member Meng, good morning. I am Larry Black, and I appreciate the opportunity to speak to you on behalf of the 6,000 Florida citrus growers. I am current president of Florida Citrus Mutual, and also general manager of Peace River Packing Company, a family citrus business.

Our family settled in the central Florida area and began growing citrus in the 1850s. Our company employs 185 Floridians, and is the largest employer in the small community of Fort Meade.

The citrus industry is a powerful economic engine contributing over $10 billion annually to the Florida's economy, and provides over 62,000 jobs. The Florida citrus industry covers over 515,000 acres, and is the largest agriculture crop produced in the State. The industry is rich in traditions, and truly a way of life for my family and many other multi-generational family farms around the State.

At our industry's peak just 12 years ago, we produced over 240 million boxes of oranges on just under 800,000 acres of groves. Today, the USDA forecasts we will harvest only 96.4 million boxes of oranges; 60 percent less than our peak harvest. Some of the decrease in acreage is due to the development boom and a series of hurricanes of the last decade. The vast majority of production losses are due to huanglongbing, or known as HLB or citrus greening.

HLB is a bacteria that attacks the vascular system of the tree, and is spread by an insect vector known as the Asian Citrus Psyllid. Neither HLB nor the Asian Citrus Psyllid are native to Florida, or even the United States. The psyllid was first detected in Florida in the late 1990s. HLB was first detected in Florida in 2005, and estimates indicate over 90 percent of the trees in Florida are now infected. HLB weakens and eventually kills the trees. The lower productivity of the trees have forced growers to abandon over 130,000 acres of citrus groves. Growers are learning how to extend the productive life of the infected trees, but production costs have more than doubled due to HLB.

Orange juice prices have increased for consumers because supplies are strained and the cost of production has skyrocketed. Higher prices and competition from other beverages has resulted in per capita orange juice consumption being reduced by 50 percent. I am confident that consumption trends will reverse as research delivers solutions that will increase yields of our groves and the per unit cost of production will decline.

Growers knew early that HLB was a monumental threat to our industry, and a massive research effort began. Citrus growers have taxed themselves and have spent over $90 million over the last 9 years to fund research. The Florida State legislature has appropriated more than $20 million for the fight against HLB. The 2014 Farm bill authorized $125 million over 5 years for citrus research funding through a competitive grant process.

On behalf of citrus growers across the country, thank you for recognizing the need for a long-term funding source for the research needed to solve the HLB crisis that threatens the citrus industries in Florida, California, and Texas. Growers are working together to coordinate sprays to control the psyllid that spreads HLB.

Antimicrobials and heat therapy appear to be possible near-term solutions to improve the productivity and extend the life of our trees.

Plant breeders are working to develop varieties of citrus and root stocks that are tolerant of HLB. It is apparent a massive replanting of the citrus industry is required in Florida. Economists estimate the Florida industry needs to plant 20 million trees over the next 10 years to reverse the decline and stabilize the Florida industry. Our company has replanted over 350,000 trees over the last 3 years using the latest production technologies available. I am confident we will bring these trees into production, and we will be rewarded for the risk we are taking. The USDA has authorized the Tree Assistance Program, or TAP, to aid growers with replanting efforts. The TAP program is a cost-share program that reimburses growers a portion of the tree cost.

The citrus industry is a core part of America's agricultural heritage. 62,000 Floridians produce a nutritious product that is part of a healthy diet. The industry is comprised of small family farms and associated businesses. The industry also supports many associated businesses ranging from vehicle and farm equipment dealers, banks, insurance companies, et cetera. I am confident our industry will manage through the current crisis and emerge as even a stronger industry.

Again, thank you for your support funding the much-needed research. Please consider incentives for growers to replant and other assistance to grow small businesses as they emerge from the crisis. Thank you.

Chairman CURBELO. Thank you very much, Mr. Black.

Mr. Murden, you are now recognized.

STATEMENT OF DALE MURDEN

Mr. MURDEN. Thank you, Mr. Chairman and Ranking Member Meng.

On behalf of the over 400 commercial citrus growers in Texas, I want to express my appreciation to you for convening this hearing today to learn more about the challenges facing the United States citrus industry and our many small family owned growers.

My name is Dale Murden. My family and I currently grow citrus and raise cattle near my hometown in Harlingen, Texas. In addition to being president of Texas Citrus Mutual, I am also a current member of the board of directors of the Texas Farm Bureau. The Texas citrus industry is comprised of almost 27,000 acres across a three-county area in the Lower Rio Grande Valley. Our growers produce more than nine million cartons of fresh grapefruit and oranges each year, and another 5 million cartons of juice fruit all valued at over $100 million.

Texas is the third largest citrus-producing State behind California and Florida. The total business activity supporting Texas citrus production is valued at $200 million annually. I know this pales in comparison to my larger counterparts, but to my fellow growers, it is worth fighting for.

Currently, the industry employs up to 3,000 workers in a normal producing year, which culminates with the harvesting period from October to May.

My testimony today will focus on two critical and pressing issues facing growers in the Rio Grande Valley. I will discuss the potential economic devastation due to the invasion of the Mexican fruit fly from south of the border, as well as the rampant spread of huanglongbing, also known as HLB or citrus greening. What sets Texas apart from my colleagues in California and Florida is our proximity to Mexico and its porous border. In addition to invasive pests coming from the south, USDA has estimated that there are conservatively over a half million citrus trees in backyards and private homes valley-wide. And we all love to grow our lemon and lime trees and real proud we can do that, but these trees pose a very significant threat to the commercial industry, and when left untreated, provide a safe harbor for fruit flies and the Asian Citrus Psyllid.

The Mexican fruit fly or MexFly is a fly originally found in parts of Central America that has now spread beyond the border into the Lower Rio Grande Valley of Texas. The MexFly is a problem for citrus fruits which are extremely susceptible to infestation. Economic losses result from direct damage caused by the larvae that feed on the fruit pulp. Since 1986, Texas has participated in a fruit fly control program headed by APHIS to eradicate the fruit fly from Texas and the Mexican State of Tamaulipas.

In 2012, APHIS thought they had successfully eradicated the MexFly, but recently, due to continued violence along the border, aging USDA rearing facilities, and untreated backyard citrus trees, the MexFly has been found once again in our region. This year proved especially hard for one small grove operation in Brownsville after a Mexican fruit fly was found in a neighboring backyard tree. The discovery triggered a quarantine and the grower was no longer able to harvest his crop for the year, leaving thousands of dollars of inventory on the trees with no hope for harvest. The problem is now reaching crisis levels. Since January 2014, there have been fruit fly quarantine areas off and on in the entire citrus growing region of south Texas.

Now, while the MexFly poses a real and immediate threat, the recent finds of HLB or citrus greening has growers of all sizes in south Texas extremely concerned. There is no known cure for this disease, and we have learned from our friends in Florida that this disease is deadly serious. Greening was first discovered in a Texas grove in January of 2012. Three and a half short years later, we have confirmed trees located the almost 100 groves valley-wide. With the extremely long latency period of this disease, it is really unclear how many more trees have already been infected. What this has done to growers in terms of dollars is hard to quantify. When it was first discovered in Texas, we removed not only the infected tree but several of the surrounding trees as well.

Today, positive HLB finds have become so widespread that most growers have discontinued tree removal. As such, it has quickly become a numbers game and a point of diminishing returns that keeps spreading throughout the industry.

In a desperate attempt to mitigate the effects of HLB, most growers have initiated psyllid spray programs to slow the spread of infestation until a cure can be found. This strategy is in addition to

our regular care programs and has already increased our grove care expenses by almost $400 per acre.

Federal investments in HLB research and ACP eradication programs are also very critical to the survivability of the citrus industry in the United States, and as such, we have requested full funding under two high priority citrus programs; the Citrus Health Response Program, and the Huanglongbing Mult-Agency Coordination.

I would like to again thank you for your attention today on these issues. In short, the United States citrus industry, as you know it, is in extreme trouble. We are fighting to preserve our very way of life and are doing everything in our power to prevent total eradication of an essential industry.

Thanks again, Mr. Chairman, for holding this hearing, and we look forward to working with you in the future.

Chairman CURBELO. Thank you, Mr. Murden.

And now, Dr. Rogers, you are recognized.

STATEMENT OF MICHAEL E. ROGERS

Mr. ROGERS. Chairman Curbelo, Ranking Member Meng, and members of the Subcommittee, thank you for the opportunity to speak to you today about the impacts of citrus greening on Florida's citrus industry.

My name is Michael Rogers, and I am an associate professor of entomology at the University of Florida where I serve as interim director of the Citrus Research and Education Center. And Citrus greening disease is caused by a bacterium that is spread tree to tree by an insect known as the Asian Citrus Psyllid. When a psyllid carrying the bacteria feeds on a citrus tree, it injects the disease-causing bacteria which destroys the vascular system, causing a prolonged and slow death of the tree. Long before the trees completely succumb to the disease, citrus fruit are reduced in size and quality, making them unusable for juice or as for fresh fruit. After a tree has been infected for several years, the trees can no longer hold the fruit on the tree, and most of the potentially harvestable fruit that growers have spend thousands of dollars per acre to grow, drop prematurely from the tree to the ground before it is ready to be picked.

Since 2005, greening has spread to every grove in Florida, infecting most, if not all, of the fruit-bearing trees to date. As a result, the 2015 orange harvest is predicted to be 96.4 million boxes, and this is down from 240 million boxes in 2003, and is the smallest Florida orange crop since 1966.

The future is uncertain for the Florida citrus industry and the 62,000 jobs that it supports. While there are many potential research solutions being developed that hold promise, putting that ultimate answer in the hands of growers is still years away. If we had a citrus tree today that we knew for certain was resistant to this disease, it would take 2 to 3 years to scale up commercial nursery production of that resistant tree for purchase by growers. Once a grower is able to actually plant that disease-resistant tree, it will take at least 4 years for those trees to begin producing a harvestable crop, and additional years beyond that time to recover the cost required to grow the tree up to that point. This is a really

discouraging prospect for the small citrus grower who currently is just struggling to stay in business.

However, there are exciting new potential solutions for living with this disease, at least in the short term. These include new citrus varieties that have increased tolerance to the disease, use of heat treatments to kill the bacteria in the plant, thus extending the fruit-bearing life of the tree, and promising bactericidal compounds still being worked on that can be sprayed on the trees to eliminate the bacteria in the tree.

With a majority of the citrus trees in the field today nearing death, to stay in business, growers must continue to replant new trees in their groves to maintain continuity of production. The short-term solutions available will play an important role in helping growers do just that. However, with depleted financial reserves, most small growers are in desperate need of financial assistance just to stay in business another season.

Citrus research programs are also being negatively affected by the reduction in fruit yields. The research funds provided by the self-imposed grower tax to the tune of $90 million over the past 10 years are starting to dry up with the fruit yields, thus threatening to impede the progress of the promising research that must be continued to provide solutions for this disease. Fortunately, the availability of new Federal research funds, specifically the USDA, SCRI, and MAC programs, are providing some support for research on citrus greening. And a very sincere thank you to those who helped provide this needed funding through the Farm bill.

While these funds support some very promising research projects, there are still gaps in funding that exist for many promising areas of research previously funded by the citrus-grower generated tax that are threatened to go unfunded in the future. Your financial support for further research is crucial for the future of citrus growers and the 62,000 jobs they support in Florida, but also throughout the rest of the country as well.

Land grant universities in every State are dedicated to serving the public, and Federal research dollars are crucial for universities to continue their research to benefit economic development.

I appreciate the opportunity to address the committee, and I also extend an invitation to any members who are interested, please contact me to arrange a visit to the CRAC where you can witness firsthand the effects of this disease and the research under way to develop solutions to this problem.

That concludes my formal statement, and I am happy to answer any questions that you may have. Thank you.

Chairman CURBELO. Thank you very much, Dr. Rogers.

I now recognize myself for 5 minutes, and I thank you all for your testimony. Some of the statistics that you shared are staggering, and it is very important that we are having this hearing today to shine a light on what represents a major challenge for the States represented here today, but more importantly, for families that are trying to stay afloat.

My first question, which is addressed to all of you, are you currently seeing or do you expect to see consolidation in the citrus industry as smaller growers sell or leave the industry due to the increased costs of production? This is a major concern for us in our

committee because, of course, protecting small businesses and strengthening them is our goal here. Do any of you fear that we are going to see a lot of consolidation as a result of this crisis?

Mr. SEVERNS. Mr. Chairman, I would like to address that in saying that absolutely we do. In California, the price of acreage, or what acreage can bring in general, is probably at an all-time high, and when growers are facing many of the pressures that they are, first of all, currently our largest, crisis being our drought situation and the things associated with that, and on top of that, staring down the problems that could becoming as far as ACP infestations and HLB, in addition to some of the trade-related issues that are pressing on us, a small grower really has to take a look at that and see whether they want to continue to maintain production in such perilous times.

So certainly we see it in California. We see those smaller growers just deciding to sell out. Some of the younger individuals are going to work for maybe some of the larger farming operations. You don't see a lot of young farmers going out and buying acreage. It is nearly impossible right now. So, certainly I think we will continue to see consolidation, unless some things change pretty radically in the near future.

Chairman CURBELO. Thank you. Does anyone else want to speak to that?

Mr. BLACK. Just briefly, I would like to add that we are seeing consolidation in Florida, there remains a role for the small grower. The small grower, like every citrus grower in Florida, is struggling but on a go-forward basis, I believe there is still a role for a small grower that is so important to the fabric and the culture of our citrus industry.

Chairman CURBELO. Thank you. Another question: Are there ways that the USDA Citrus Health Response Program and Multi-Agency Coordination Group could be improved? Can you help us evaluate how these programs have performed and give us some ideas as to how they can do better?

Mr. ROGERS. I will just make a couple of comments. First, we really appreciate the funding that we have received. And I was going to mention there are two Federal programs, the SCRI, which is providing direct research for greening through the Farm bill that is $125 million over a 5-year period; and then we have the MAC funds as well. And the difference between those two, the MAC funds are providing the ability for us to do research projects that provide more short-term answers that can be used more immediately by our growers in the field. And this type of funding is very important.

As I mentioned in my testimony, growers are having to make decisions today about going out of business. Are they going to stay in business or are they going to give it up? And the funds from the MAC program are helping us quickly develop projects—or programs or approaches that growers can use now. While the SCRI is more long-term funding, very important science through the SCRI program, but it is more long term in its goals. You know, it is looking more for the ultimate down-the-road answers to this problem. And so I don't know if that answers your question, but the MAC funding is very important for us.

Chairman CURBELO. Mr. Black.

Mr. BLACK. Chairman, I would also like to speak to the Citrus Health Response Program, or the CHRP funds. The CHRP program is a relatively old program that was developed to deal with another problem, citrus canker, and what is very unique about the CHRP program is it offers flexibility for each industry, Florida, California and Texas, to tailor the program that fits their needs.

As you heard this morning, each of our industries are in a much different state as they battle HLB in their groves, and so the CHRP funding provides that flexibility for each State to fit their needs and be most efficient with those dollars.

And also would like to echo Dr. Rogers' comments that the MAC funding is essential to fund short-term shovel-ready-type projects to get those into the growers' hands as quickly as possible.

Chairman CURBELO. Thank you.

My time has expired. I would like to recognize the ranking member for 5 minutes.

Ms. MENG. This question is for anyone on the panel. As you know, the SBA size standard for a small farm is $750,000 in annual receipts, which can vary significantly between the type of farm, and even year based on inflation. These definitions are important because small businesses have additional resources allotted to help them succeed, and if a farm is not considered to be a small business but operates as one, that can significantly impact its ability to succeed.

How does this definition help or hurt your industry, and is the current size standard an accurate reflection of the industry? Or if you had to create your own size standard, what would it be based on? Employees? Acreage? Receipts?

Mr. SEVERNS. Ranking Member Meng, I certainly don't mean to sound like I am evading that question, but it is very difficult to define. In terms of just a dollar amount, $750,000, I quickly did the math on that, and as I mentioned, 300 acres is more like a small grower as it stands right now. Years ago that was different. Years ago that was more like a 40-acre grower. Well, $750,000 is $2,500 an acre for that grower. If we're talking gross receipts, that doesn't even pay its farming costs. If we are talking about net overall receipts, that gets them a little bit closer.

But as I mentioned, when you have situations like you have in California where either you have to engage in a battle with the ACP and/or on top of that, pay for water if you can get it, which was prior $200 per acre foot to now you could be paying well over $3,000 per acre just for water. So I'm not meaning to evade the question, but I think a dollar figure may not adequately address the issue.

Mr. MURDEN. Ranking Member Meng, I've got an analogy about that. My grandfather made his living on 200 acres of farmland, raised three daughters, put them all through school. If I tried to do that today, I would probably starve to death. So things have just changed dramatically, and it is hard to put a number on it, but, you know, I wished I could do what my grandfather was able to do because I would rather just farm 200 acres than killing myself trying to do more, more, more, but it is just a different day and a different time, and costs keep increasing.

Ms. MENG. Is there a better standard or measure that you think the Federal Government should use to more accurately reflect what determines a farm to be a small business or not?

Mr. BLACK. Ranking Member Meng, I believe revenue is the easiest measure, but I do believe it needs to be increased. The $750,000 for the small business is too low.

Ms. MENG. Thank you. Where do each of you see your industry in the next decade or so, especially considering the numerous challenges you face? What is the most pressing issue for small citrus operations, and what is the best way for us to assist your industry? For example, increased funding? Amending regulations? Trade policy? Tax breaks? What is your wish list?

Mr. MURDEN. All of the above.

Mr. SEVERNS. I would agree with Mr. Murden. Certainly the trade issues that are before us are very important to California. We export a very high percentage of our crop, and export is certainly important to us, and it is a large source of our growers' revenue. So from a California perspective, we support TPA, and we would like to see that pass.

As I look to the future of the California industry, I am always optimistic. I think any grower, any farmer is optimistic. That is how they live life. They make a bet on an entire year that they are going to be able to recover their costs and make some. So from a perspective of just who we are, we are optimistic. When we look at the challenges coming at us, whether it be HLB or ACP or water or any of the regulatory issues, as mentioned before, the regulatory issues specifically impinge on a small grower, because generally a larger grower hires people to take care of that. The smaller grower is his people. He takes care of those particular issues.

Additionally, as far as the water issues are concerned, in California, if we don't resolve some of those very soon, if you can get water, you have seen a radical change in the amount of money that it takes to farm per acre.

Ms. MENG. Thank you.

Chairman CURBELO. Thank you, Ms. Meng.

I would now liked to introduce and recognize my colleague from California, Mr. Knight.

Mr. KNIGHT. Thank you, Mr. Chair. I thank you for the indulgence. I don't sit on this subcommittee, but I did have a couple questions and mostly for Mr. Severns.

I appreciate you doing what you do. It is difficult out there, and there is nothing like the water issue in California. I cannot impress upon that enough. I think that when I talk to my other colleagues in Congress, there is nothing that we talk about more. I tell them this is a national emergency. You don't understand what is happening in California, and I think that they will come about August of this year. You will see the impacts.

But the zero allocation, I think that people don't get that. That you don't get any water unless you are pumping it from the aquifer or from your wells. That is how we are getting water to our farms in California right now. And the aquifers are being depleted in some areas. Some areas have plumes that they cannot be taken out of anymore, and it is getting more and more difficult.

But my questions are more specific to what we are talking about today with the disease that is happening. I understand in Florida that it has taken over many of the areas. Has the California legislature taken this as an issue? Have they seen this as something that could strike the citrus industry in California, or are we waiting until this becomes a bigger problem?

Mr. SEVERNS. Absolutely not. A number of years ago Assembly Bill 281 created the Citrus Pest and Disease Prevention Committee in California. I happen to be secretary/treasure of that particular committee. We assess all of our growers about eight cents a carton. It brings in somewhere between $15 to $18 million per year for us to fund this program that is involved in trapping and suppression, and in the case of finding HLB, eradication were that to happen. And so far, while we have had a spread of the psyllid in the southern California area, in the central California area we have been much more successful. And so far we have had one tree, that was discovered in southern California with HLB. It has since been removed. We continue to test the trees all around it and have had none of those trees come up positive.

So there has been a response in California to this in a positive sense. Our industry works directly with CDFA and USDA in administering this program. We are fortunate enough to see what happened in Florida and received advice from them on being proactive in this, and that is a lot what generated or initiated our CPDPC program.

Mr. KNIGHT. Okay. And I guess my next question is to Dr. Rogers. Have you seen in the last, maybe couple of years that Florida has been going through this advancements that are now making it so we can extend a orchard to where we couldn't have 4 years ago, or——

Mr. ROGERS. Yes. Absolutely. We have definitely made a lot of advancements. And we have learned more about this disease. We are learning how not only to better manage the psyllid and slow down the disease spread, but once the trees are infected, we are learning more about how that pathogen moves in the tree, how it affects the tree. And ultimately, we are looking at a lot of things like enhanced nutritional programs and better watering, the effects of soil pH and bicarbonates.

Some of these issues come together, and when we address those issues, I am not saying we are going to resolve the disease or cure it, but we can maintain trees for a number of years longer than we could have in the past. Because if we weren't at that point now, most of the trees would be dead, and that doesn't mean that we have got a lot of time, because we really haven't. We have been living on borrowed time for quite a while now. And so—we are seeing small growers going out of business weekly.

Mr. KNIGHT. Okay. And, Mr. Murden, you brought up a subject, the Mexican fruit fly that we have been dealing with for many years. Tell me how that is affecting in Texas. Is it affecting the situation worse than it was 20 years ago? Have we kind of maintained this?

Mr. MURDEN. I think it is probably worse, and there are lots of reasons and lots of blame to go around, I guess, if you will. You know, we have got a real aging rearing facility down there. It is

like a 1940s Army barracks, Moore Field Air Base, that was back in World War II that is our rearing facility. It is in disrepair. We have got the issues along the border with Mexico. Our counterparts in Mexico can't go out and do the trapping, the scouting, or the releases because of the violence along the border. So we have got several issues going on. The door yard properties in our case is a huge, huge problem. They go untreated while we treat in the groves. You won't find the fruit fly in the grove, but due to the current quarantine restrictions, if the fly was found in the backyard, it is going to affect the adjacent grove from harvest.

Mr. KNIGHT. Thank you very much.

Thank you, Mr. Chair. Thank you for bringing this forward and talking about this issue.

Chairman CURBELO. Thank you, Mr. Knight.

And Ms. Lawrence, you are now recognized for 5 minutes.

Mrs. LAWRENCE. Thank you.

Mr. Black, first, I want to commend you for your rich tradition of your family business and your contributions to the economy, and the jobs you provide in the community. Thank you.

While citrus farms are not prominent in Michigan as in Florida and California, we do rank, I just want to brag, we do rank number one nationally in the production of blueberries and tart cherries. We have our claim to fame.

In your testimony, you talk about the—changing the Tax Code to allow growers to immediately expense costs in the year that they take place. Mr. Black, can you elaborate on the need for the change and how it benefits citrus growers, and would the government experience any cost, and if so, would they be substantial? Can you comment on that, please?

Mr. BLACK. Yes. Thank you, Ms. Lawrence. The proposal to change the Tax Code would offer an incentive for growers to plant trees to increase and accelerate the pace they are replanting. Currently growers have to capitalize the cost of the trees and the preproduction cost, all of the labor, spray, water, et cetera, for 4 years, and then at the end of 4 years, they place that asset in service and depreciate that asset for a period of 10 years.

What our industry is proposing is similar to Section 179 depreciation that allows for the immediate expensing of those assets when they are purchased. That is really a timing issue. The grower is allowed to deduct the same expenses as he would under the current model, but rather than over a 14-year period, it would be immediate expensing. So the cost would be the interest costs for the government to delay those tax receipts over the 14-year period as opposed to receiving them right away.

Mrs. LAWRENCE. Would this change have an impact or this incentive, do you see it going across other types of fruit industries as well? Do you—are you advocating for this to be a change in the Code that would impact all growers?

Mr. BLACK. No. The current legislation is solely for citrus trees across the United States, but, no, we do not propose expanding that initiative. In my opinion, the section 179 depreciation allowance has been very effective to stimulate the economy and increase the capital spend by businesses.

Mrs. LAWRENCE. Thank you.

Any other members of the panel would like to comment on the Tax Code?

My last question is, we talked about the fruit flies, and I think it was Mr. Murden commented on that. You talked about what you are currently doing to mitigate it. What are the costs? What would it cost to mitigate the fruit flies? And do you have—as far as the government, how can we partner with you in that?

Mr. MURDEN. We actually already are. APHIS is a very strong partner in that, and it actually is kind of a three-pronged approach. The growers have an assessment that they kick into this eradication program and scouting program. Our Department of Agriculture does as well in Texas. And APHIS carries the lion's share. We have just got lots of problems and lots of needs. The biggest and foremost is that aging facility down there and trying to get it in a budget for USDA to re-do. I think the last estimate I heard to rebuild that facility is close to $30 million.

Mrs. LAWRENCE. Okay. Well, thank you all so much.

Chairman CURBELO. Thank you.

Mrs. LAWRENCE. Yield back.

Chairman CURBELO. Thank you, Ms. Lawrence.

I recognize myself for 5 minutes.

Mr. Severns, your comments on TPA are timely as it seems like the House will be considering this legislation tomorrow.

Can you expound on your support for TPA? I think there is an assumption that most in the agriculture industry would be opposed. Could you comment a little more on why you are supportive? And if anyone else would like to comment, and maybe perhaps with differing views, you are welcome to do so as well.

Mr. SEVERNS. We export a very significant portion of our crop, and allowing that negotiation authority and being able to work these issues out on a timely basis are crucial to where we are even at this time in negotiations with different countries on export issues.

I might mention that by virtue of the fact we do export the amount that we do, it is important that authority be extended, and in so doing, we are able to maintain those markets and maintain those negotiations and work through some of these issues on a timely basis, and if we don't have these crucial export markets, there is only a few other things that can happen, and one of those things is that fruit dumps back on the domestic market.

Domestic consumption, while improving, has been relatively flat over the last number of years. So that export market, in addition to being an outlet other than the domestic market, also is a place where we can really excel. And it has been very important to the growers' overall return to be able to participate in those export markets.

We deal primarily over in Southeast Asia, Japan, and Korea. Those countries are very important to us.

Chairman CURBELO. Anyone else have any views on free trade that they may want to share whether specific to the current TPA——

Mr. MURDEN. I agree with everything Kevin said, actually.

I will put on one of my other farming hats right now. China is one of our largest markets. So I think it is very important.

Mr. BLACK. I would like to add, trade is a very important part of our business, but also recognize that both HLB and the Asian Citrus Psyllid are invasive. They are not native to our State or our country. So as any part of a trade agreement, please consider port inspections, et cetera, to keep our domestic industries across all agriculture safe.

Chairman CURBELO. Thank you for those comments. And, in fact, as I understand it, higher standards for agriculture are one of the key goals of the current TPA that we are considering.

I also want to ask about the H-2A Visa Program. This is a program that allows certain American employers to bring foreign nationals to the United States for low skill temporary or seasonal agricultural jobs for which American workers are not available.

Can you describe the extent to which you rely on H-2A workers to help harvest your fruit? And what challenges have you encountered in ensuring you have a sufficient labor force to do the work needed on a timely basis?

Mr. BLACK. Chairman Curbelo, our business does not engage H-2A workers. We have been fortunate that we have been able to pull in our local labor pool and have not had to file a petition and secure H-2A workers. However, approximately 80 percent of the Florida crop is harvested by H-2A workers. So it is very important to the Florida industry, and there are definitely changes in the H-2A program that would be welcome for all of agriculture to make that process easier for growers when they need to source workers to harvest their crops and other ag work.

Mr. SEVERNS. We in California tried the H-2A program. In the context that we did try it, it didn't work very well for us, to be very frank about it. I don't know that I would throw the baby out with the bath water, so the speak. I think there were some logistical and communication issues that made it very difficult. But at this time, we don't use any H-2A workers.

I will say that having a sufficient labor force to harvest our crop in California is a very, very difficult issue right now, and looks like it could get more difficult.

Chairman CURBELO. Thank you.

Ranking member is recognized for 5 minutes.

Ms. MENG. Emerging scientific consensuses hold that genetic engineering is required to defeat citrus greening as they can find no other way to combat it. They make the argument that most crops have been genetically modified in some way to reap the most desired fruit, vegetable, or green. In fact, many popular types of apples fit in this category.

What are you hearing from small citrus growers as to their openness to this approach, and have you conducted any consumer research into this particular solution? And, Dr. Rogers, maybe what are some of the pros and cons of these methods?

Mr. ROGERS. Okay. First, to answer the question, have we actually surveyed growers for their willingness to plant a genetically modified crop; I don't have the information in front of me. There is a document that the University of Florida extension has put out that was a survey of growers on their willingness to adopt GMO technology. And the growers were overwhelming in support of doing that. So it was very clear cut.

So to the questions—what was your second question? I am sorry.

Ms. MENG. The pros and cons and what consumers may——

Mr. ROGERS. Pros and cons, okay.

And I think when you look at the whole thing about genetically modified crops, people come in thinking of Frankenfoods or something like that. But there is a lack of education on what is going on, because when you look at a conventional plant-breeding program, you take two different plants, they cross them trying to get a superior trait, maybe it is a flavor, or a taste, or appearance that a consumer wants to buy. You don't control what gets crossed when you do those types of breeding programs.

So there have been cases with potatoes and some other crops, where they have actually crossed them, and they have had products that were actually unhealthy for humans, and you can't control that. With genetic modification, you actually control the specific gene that you want to change, and nothing else gets changed. So you know exactly what has happened.

And we can talk all day about some of the pros and cons, but there is definitely a lot more benefit, and there is really not any negative other than the public perception.

But I do want to mention one other thing that is happening that is really interesting. We do a lot of work on genetic modification in Lake Alfred at the CREC. And our plant breeders are taking genes spores resistant to greening that had been identified to citrus and moving those now to commercial varieties that we want to grow. Because a lot of the resistance we have, we can call them a library of plants that the breeders have. They are not commercially suitable varieties, but they are moving genes from one citrus plant to another.

But then they are also finding ways to turn off the plant's response to the disease. By just simply deleting a gene that allows the disease to be expressed, you can have the same effect as far as mitigating the disease. So you are actually not even adding anything to the plant; you are just taking something away. Those are probably more likely to gain regulatory approval and be something that we can do in the not-too-distant future regulatory-wise. We have a lot of these types of projects in the field, looking at genetic-modified plants that are very promising. We have very promising results right now.

Mr. SEVERNS. Ms. Meng, I would like to make a comment on that. Two different things come to mind for me, and they are: trying to engage the public in a rational, intelligent conversation about the whole GMO issue is one. And, also, having an understanding that there is a very distinct possibility—and this isn't hyperbole; it is not an exaggeration—that if HLB continues unabated, we won't have any citrus in America. So if the question was asked, do you like citrus enough, what would you be willing to accept in order to continue to have it, and that doesn't necessarily mean it is a GMO-only solution, but I think that question does have to be asked, because that is a possibility.

Ms. MENG. Okay. Thank you.

I yield back.

Chairman CURBELO. Thank you, Ms. Meng.

Mr. Black, maybe you can help us bring this all home. You noted that while the citrus industry is comprised of family farms and associated businesses, it supports many other businesses. Can you explain how important a vibrant citrus industry is to Florida's economy, and particularly to small Florida towns, or maybe people watching this hearing today wondering why this Congress focused on this issue? Why is this important?

Can you expound on—in the State of Florida, for example, why the citrus industry is so critical.

Mr. BLACK. Thank you, Chairman Curbelo.

Florida is a very diverse State. You fly into Miami and drive just a couple of hours to the small community of Fort Meade, where our business is located, you wouldn't think you were in the same State at all. Florida has a network of small communities. Fort Meade has approximately 5,000 residents. Our company is the largest employer, but we also support from the automobile dealership to the hardware store to the grocery store, where our employees shop, et cetera, et cetera. The domino effect, the multiplier effect of our industry is unbelievable in small communities where the other mainstay of the Florida economy, tourism, is just not present.

Chairman CURBELO. Thank you.

Ms. Lawrence, do you have any additional questions?

Mrs. LAWRENCE. Yes, please.

Chairman CURBELO. You are recognized for 5 minutes.

Mrs. LAWRENCE. Thank you, Mr. Chairman.

My question was a follow-up to—and I really am glad that the chair brought up the issue of the trade.

My understanding is that while there are open doors for our country and your industry to export, where are you with the import issue?

You know, absolutely, Mr. Black, the control and the regulation of the quality of the food that we receive is a very, very high priority. But with that being said, I am very much in tune to the auto industry, and I know that the—this bill, without controls of tariffs and other issues, it gives an advantage.

Our current proposal gives advantage to the foreign companies where they can devalue the yen and do a lot of things.

So let's talk about the—if we open the doors to the citrus market through the trade, how would that impact my United States costs, and your ability to maintain a certain level of profit in your industry? Has that been considered and discussed?

Anyone can jump in on that.

Mr. BLACK. Sure. Mrs. Lawrence, I will start.

Brazil is Florida's largest competitor and the dominant force in the orange juice business.

Mrs. LAWRENCE. Okay.

Mr. BLACK. We have a tariff in place on imported orange juice that, to a degree, levels the playing field due to the labor cost differential, regulatory cost in our country that is not as prevalent in Brazil.

So you make an excellent point that as trade negotiations ensue, that all industries be considered and that we have fair trade above everything else.

Mrs. LAWRENCE. Mr. Severns, do you have anything?

Mr. SEVERNS. My understanding is that as trade promotion authority passes, that Congress still has the ability to vote on that particular deal, if I am understanding correctly, not necessarily each and every aspect of that.

Certainly, we are concerned about what comes onto our shores right now, not just from a trade perspective, but from an invasive species perspective and that sort of thing.

We currently do have offshore fruit coming in, and that does directly compete with the product that we have. And I guess inasmuch as we live in a global economy, that is not to be unexpected.

Certainly, our perspective is going to be what we think is healthy and beneficial for the citrus industry. And in my comments, I don't mean to make particularly any other comment about another industry other than to simply say from the perspective of trade and the perspective of what we would be able to do through export, it would be an improvement of the situation for us, and that is why we support it.

I would hope that because of the continued ability of Congress to approve or disapprove any certain trade agreement, that would still create a check and balance for the other industries as well. Thank you.

Mrs. LAWRENCE. Dr. Rogers, or Mr. Murden, any comments on that?

Mr. MURDEN. I think with any trade agreement, the devil's in the details. I understand free trade is not always fair trade. I have been a product of that down in the Mexican border for a long time. So it is up to y'all to trust but verify, so to speak. I do agree with your concerns and Kevin's as well on the invasive species and pests that can come across. So you have go to watch it. But the fact of the matter is, we grow more than we can eat, so we need to have the ability to get it out there.

Mrs. LAWRENCE. Okay. That is a question that I really, as we are now debating and entertaining this, is the devil is in the details. And that, you know, just to say that we want trade and open up the gates, there is an obligation, responsibility of Congress to ensure that it is fair and that we do protect the quality that when we start talking about food that is coming into our country. So thank you very much.

Mr. SEVERNS. Thank you.

Mrs. LAWRENCE. I yield back, sir.

Chairman CURBELO. Thank you, Ms. Lawrence.

I want to thank all the witnesses for taking time away from their businesses and families to participate in today's hearing. The United States citrus industry produces the fresh fruit and juice that nourish millions of consumers on a daily basis and are a vital part of our economy.

For small growers, the increased costs of production due to HLB, the Mex line, the drought in California, pose significant challenges. Most alarming is the threat to citrus growers in Florida, California, Texas, and Arizona from HLB. The Subcommittee on Agriculture, Energy, and Trade will continue to highlight the problems that small agricultural operations are facing and examine policy solutions that allow farmers, their families, and employees to thrive

and provide the fresh produce and other goods that Americans consume and value.

I want to thank the ranking member for her cooperation in setting up this hearing. I want to thank you all, again. We are about small businesses in this committee, which means we are about families and the people who they employ.

So we will continue doing everything we can to shine a light on this and to be an advocate, not only here in Congress, but more broadly, in the Federal Government to make sure we do right by our small businesses, the families they represent, and all the people they employ.

I ask unanimous consent that members have five legislative days to submit statements and supporting materials for the record.

Without objection, so ordered. This hearing is now adjourned.

Mrs. LAWRENCE. Thank you.

Mr. BLACK. Thank you.

Mr. SEVERNS. Thank you.

[Whereupon, at 11:15 a.m., the subcommittee was adjourned.]

APPENDIX

Testimony of

Kevin Severns, Severns Farm

On Behalf of California Citrus Mutual

"Squeezed: Current Challenges for Small Citrus Operations"

United States House of Representatives

Committee on Small Business

Subcommittee on Agriculture, Energy and Trade

Washington, DC

June 11, 2015

Chairman Curbelo and Ranking Member Meng, thank you for the opportunity to testify today on the challenges that small citrus growers like me are facing.

California's varied climactic conditions and unique topography create a perfect environment for a year round supply of oranges, lemons, tangerines and mandarin varieties. The Golden State's lemon crops from Imperial County near the southern border to Madera County in the north-central San Joaquin Valley produce fruit of unparalleled quality. California's inland valleys with their rich soils, hot summers and (usually) cool wet winters yield the best eating oranges in the world. All of this...and we have the global demand to prove it. I should also mention the fact that our State grows 50% of America's fresh produce and California supplies 85% of the United States' fresh citrus! Our citrus growing areas stretch from the very southern end of the state over 700 miles north into Glenn County in northern California. Our state is truly a "Garden of Eden" that provides healthy, safe products to a hungry world.

Years ago, small family farmers moving west to California launched a gold rush of another type...(And a sustainable one at that!)...a citrus industry that has provided our nation with "eating citrus" for nearly 150 years! Today we have about 3,500 growers, 100 packing houses and probably 12,000 or more employees that work in many cases year-round. We sell citrus in all 50 states and many (if not most) countries of the world. It would be a dangerous mistake for either the grower or the citizens of our great country to assume that a domestic citrus industry exists as a birthright and will just always *be there* without great effort to sustain it. The major citrus producing states represented here do what the other states cannot—that being the production of citrus fruits for the rest of the nation and the world on a year around basis!...This is no small reason to do everything possible to ensure that citrus production in these states remains vibrant.

Defining a "small citrus grower" is a lot like explaining the size of a fish...it depends on what pond you are fishing out of! Years ago, a 40 acre citrus grower could make a reasonably good living. 50 years ago, a 40 acre grower, while doing much of the required work and tree care by his or her self and/or family members, probably lived in a modest home on the family acreage, drove a decent car and sent their kids to local colleges or universities. Often the young ones would come back to the farm and take over when mom and dad were less able to do the work in their later years. Today, the number of acres needed to accomplish something that might be more like 300 acres. It would be impossible to farm that much acreage without some full time help. The grower of today has to contend with many issues *in the normal course of operation* that was not required 50 years ago. Food safety/Good Agricultural Practice logs and annual audits, Pesticide Use Reports, Ground Water Management Plans, Well Drilling Permits, Illness and Injury Prevention Programs, continuous updates of Material Safety Data Sheets, Employee Safety Training, Workers Comp and Liability Insurance Issues, Farm Equipment and Truck Emissions requirements and updates previously were not part of a growers day to day tasks. Nor were Highly Erodible Lands and Wetland requirements—and that's just a very partial list of what it takes to run an operation today! Not that any of these things are bad, *per se,* but they demand people, time and significant capital to deal with properly. It is pretty much impossible for a small citrus grower to handle all of these demands on their own. Outside help and consultation is nearly always required and none of it is free.

So the options are get bigger, take an outside job or sell out. I, as many other growers do that own acreage of my size, work a "regular" job to, as we say, "support my farming habit". That is not to say that I don't love what I do, both as a farmer and a citrus packinghouse manager—I do—that's why I do it. But as with many like me, my children have seen the hard work, time and stress involved in maintaining their lifestyle. They have chosen other career paths. I really don't blame them. It is hard already, ***without*** the additional **stressors** to those already described. I'll go into more depth on the other challenges we face as I continue to lay out the narrative.

At one time California boasted 285,000 total acres of citrus production. Primarily due to the drought conditions in the State, that number is now down to 270,000 with more scheduled to be bulldozed this summer. The small citrus grower is disappearing from the landscape of California's rich agriculture heritage. A "young" citrus grower is a very rare individual these days and if you do fine one, chances are they are working for a larger, corporate farming interest.

I want to make sure that my message doesn't denigrate the "large" citrus grower. This is neither my focus nor desire. Our Industry needs those larger operations with their efficient economies of scale. To be sure, it's the larger citrus growers that have forced our industry to modernize and supply the consuming public with varieties that they desire. The larger interests have been key in pushing innovation and research that has aided all citrus growers.

Simply put, we need them, but I would suggest that a healthy citrus industry is also a diverse citrus industry. While the well-being of large scale citrus growers is vital to the health of our Industry, I would also say that the health of the smaller scale operators is just as important.

Moving forward through this narrative I hope to illustrate the additional "stressors"—beyond what has already been described. Hopefully a clearer picture will emerge as to why many small family-based operations either have, or are considering "selling out" while properly values in California are at inexplicably high prices per acre. If at the end of this presentation you understand why younger owner/operators are becoming a rare find and why small scale citrus growers (and, in a parallel sense, ***all*** citrus growers) ought to be considered for the Endanger Species List then I will consider the honor of being invited to address this Committee a success.

No more U.S. Citrus?

In fact, it seems entirely appropriate to ask ourselves: "Do we ***want*** a domestic citrus industry?" Are we OK with potentially sourcing citrus fruits (or other produce commodities) from distant shores? Do we realize that U.S. grown citrus has a flawless record as a healthy, safe, nutritious and affordable product yet could very easily disappear from our store shelves? This isn't just hyperbole. If we continue on our current trajectory, it is very likely that this could happen in the not-so-distant future! Invasive pests and diseases, drought, misguided water policy, 40 years of inaction with water infrastructure (as the population in the state doubled in California), international trade issues and the interaction of all of the above have caused our great industry "ship" to drift perilously close to being dashed to pieces on the rocks.

We in California see the decline in production in Florida and the other south-eastern citrus producing states. We share the desperation of the Florida and Texas citrus farmer as Huanglongbing or HLB, a disease that kills any citrus tree it infects, ravages their groves! We see our future in them and realize that if a solution is not found soon ***we will all be done producing citrus.*** This disease does not discriminate between large and small growers. Other stressors we will discuss later will likely create some distinct disadvantages for the smaller producer, but the potential for all of us suffering great loss is high. In California, we have the bug, the Asian Citrus Psyllid (what I will refer to as the ACP), that spreads the disease and know that the probability is high that we will eventually find some "hot" (or HLB infected) trees out there. The task before us is to keep the ACP away from any potentially infectious trees and also to find those infected trees before the ACPs do and remove them before HLB can gain a foothold.

We were fortunate enough to find a lone tree, in Southern California that tested positive for the disease after a scout saw its symptoms. That tree was removed and a few years later we continue to test nearby trees for the disease, thankfully with negative

results *so far* but we are not so naïve to think that's the only one. That tree was grafted with bud wood from an HLB infected tree in Southeast Asia that was illegally transported buy a hobby gardener. Chances are, this individual did not know that he was doing anything wrong or dangerous. But as is so often the case, one small spark had (and continues to have) the potential to wipe out an entire forest of citrus production, a $2.4 billion dollar industry in California. Again, any assumption that I am exaggerating should be fact checked with just about any Florida citrus grower! They are the unfortunate voice of experience that our California Citrus Industry listened to and heeded just before the first ACPs were found in California.

The warning was clear: Control the bug, keep it away from diseased trees and you'll stem the spread of the disease. Florida growers were more than willing to tell us their stories, what they did and didn't do—and what worked and what didn't. They told us of the mistakes they made in not controlling the ACP. At the time, little was known about the latent nature of the disease. A tree can be infected for two or three years before it begins to decline and in fact can test negative for the disease until just before it begins to show symptoms. Florida growers told us that they knew the ACP was spreading but they weren't seeing the disease—until it was too late. When evidence of the actual HLB disease began to show up in Florida, despite an aggressive infected tree removal effort, it was soon evident that Florida growers were not going to be able to keep ahead of it. Florida growers had been hit by multiple tree damaging hurricanes, Citrus Cancer Disease and simply, when the ACP showed up, they had lost the resolve to fight a pest that wasn't yet causing a problem that was evident.

Now Florida's citrus production is in free-fall. If some type of cultural, scientific (or combination thereof) solution is not found soon, Florida's Industry will cease to exist as we know it. They have already suffered critical damage and even now, even ***if*** a solution is found soon, Florida, as a citrus producing state will never be the same. Texas is also well down the same road as the disease has now jumped the southern border and has begun to spread north through their production areas. California, again, has had the unfortunate advantage of observing these situations unfold and we have done our level best to heed the warnings and take a very aggressive, proactive approach to beating back the bug that carries the disease and quickly remove any tree that tests positive for the disease. All of that said, we realize that we are just trying to buy time—time that whether by providence or science (I would say that both are the same) gives us opportunities to find a solution to the disease itself.

In September of 2011, California state legislation was passed that created a new industry Committee tasked with vetting and implementing a robust statewide trapping, testing, suppression and eradication effort. The Committee was to be funded by every commercial citrus producer in California. All commercial growers in California assess themselves (currently) $00.08 cents for every 40 pound carton equivalent of citrus produced. Over the past five plus (5+) years, California Growers have self-funded an effort that has

collected about $15 million annually to pay for the efforts of the California Citrus Pest and Disease Prevention Program—ad it's oversight committee, the California Citrus Pest and Disease Prevention Committee or CPDPC. We in California like to refer to it as the AB 281 Committee, because the passage of California State Assembly Bill 281 is what brought the program into existence. A broad range of Industry members sit on the Committee, all for ZERO compensation and I might add with no small investment of time. I have the honor and privilege of serving the Executive Committee of that Board as Secretary/Treasurer.

That is not to say that the AB 281 Committee works alone. The California Department of Food and Agriculture administers the program and executes regulatory, ACP trapping, disease testing and residential treatment programs across the State. The United States Department of Agriculture (USDA) partners with us through the Citrus Health Response Program (CHRP) and the USDA's Animal Plant Health Inspection Service's Multi Agency Coordination group headed by Dr. Mary Palm. All told, the CPDPC is tasked with overseeing a $25 million per year effort that also includes a promising beneficial insect (or parasitic wasp) program. The CPDPC is also aided by the California Citrus Research Board and the many research projects feverishly looking for new ways to detect the disease earlier, destroy the bug, destroy the disease in the tree (without destroying the host tree), finding disease resistant trees or rootstocks, and finding a better, more effective beneficial parasitic insect to slow the spread of the disease-carrying Asian Citrus Psyllid. The Citrus Research Board has been a longstanding effort of the California Citrus Industry and is funded by a separate grower assessment that collects another $00.03 per carton from California Citrus Production.

At this point I would like to take a brief moment to urge continued support of the Citrus Health Response Program administered by the USDA's Animal and Plant Health Inspection Service. CHRP involves all of the citrus producing states and has as its stated goal "to sustain the United States' citrus industry, to maintain grower's continued access to export markets, and to safeguard the other citrus growing states against a variety of citrus diseases and pests. This is a collaborative effort involving growers, Federal and State regulatory personnel and researchers."

So far we in California have been able to hold the battle lines against the disease. We have appealed to residential citrus tree owners to work with us in monitoring their trees for the ACP and the HLB disease. At this particular moment in time, we have been successful against HLB disease. Controlling the Asian Citrus Psyllid has proven to be much more of a challenge with nearly all backyards in the Los Angeles basin having at least one citrus tree growing in them. The area is currently a hotbed of ACP infestations but subsequent treatments of those outbreaks appear to have stemmed any additional HLB discoveries—but we cannot let our guard down! The San Joaquin Valley and the northern citrus producing counties have had to deal with occasional, small ACP detections (in terms of numbers) in some residential and commercial citrus. Quarantines, while costly and inconvenient to deal with have

become something the Industry has learned to manage through. Growers are aggressive about treating local detections by both conventional and organic means—but doing so is expensive. So far-so good, as far as ACP in the San Joaquin Valley, but there are some seemingly unrelated threats that have significant potential to converge and make victory in the war to survive much less promising.

Drought and Water Policy. "Extreme" fails to describe the drought and water situation in California. I say drought ***and*** water because some of the issues are simply a matter of a lack of normal rainfall, others are the result of misguided (and an absence of) sound water policies in California. The area I serve as General Manager of Orange Cove-Sanger Citrus Association receives surface water primarily from the Friant-Kern Canal which in turn has water originating from the San Joaquin River. We are going into our second year of "zero allocation" of water from Friant. What little water that has been acquired by local growers has been the result of other users that have fallowed land and/or given up water that they have a right to for significant compensation. The Orange Cove-Sanger Citrus Association is a microcosm of the California Citrus Industry, particularly along the eastside of the San Joaquin Valley. The cost of water has gone from around $200.00 per acre/foot just a few years ago to as much as $1,300.00 per acre/foot today. The average is probably around $1,000.00 per acre/foot. Generally, citrus trees need about 3 acre/feet per year. Doing the math, the grower paying $1,300.00 per acre/foot has had a 650% increase in water cost, **if** it's made available!

This is a bad deal for everybody, from the grower to the consumer. It is particularly hard on the small family farm that may not be capitalized as well or may not have the resources to seek out solutions such as water transfers, etc. As bad as the cost of water is, it is really immaterial if a grower is forced to remove or abandon their grove because surface or ground water is simply not available. We have a number of growers within our Association that are dealing with this very situation, and again, that is to illustrate what is happening in an industry of which we are a 1.5% portion! Unlike some row-crops, we do not simply "plow-under" one season's crop and replant when (and if) the water returns. Citrus trees can take from 3 to 5 years to yield any viable production and 7 to 9 years before they have paid back their own cost of development and become profitable!

It would be sad enough if all this was simply a result of the lack of rainfall but it is not. California's water system in its current condition was designed to handle half the population that now occupies the state. If we had kept to the task of continuing future water projects we would be in a much better position to provide water for people, farms, jobs and fish! While California recently passed a water bond that is a very positive step in the right direction, it will do little to fix the current situation. Contrary to recent media reports our water woes **are not** the result of "Big Ag's" overuse of water but rather (in addition to the drought) the creation and aggravation of an already difficult problem by interpreting the Endangered Species Act in a way that is completely unbalanced. Restoring a salmon fishery might be a worthwhile endeavor if it

hadn't been attempted in the midst of an historic drought. If the reservoirs and canal systems that were once a part of a grand, visionary plan that California's lenders of years ago had conceived had been developed, might we have enough water to carry our cities, farms and fisheries through our current dry cycle? Nature has created the current crisis but neglect and unbalanced environmental policies have made it a true disaster! The way the Endangered Species Act is currently being implemented has, as many farmers would attest, put many a family farmer in the category of endangered. If we don't find a more balanced approach to the ESA, not only will fish be endangered, but many smaller family citrus farms will become *extinct!*

Earlier in this presentation, I suggested that many of our current challenges to the continued existence of the California Citrus Industry are interrelated. As an example, take a grower who has lost their water. The grove simply dries up. It can take a citrus tree years to fully succumb to a lack of water. From an economic perspective, that tree is essentially dead from a production standpoint after a partial summer of no water. If it *does* set a crop, the fruit will be unmarketable because of poor taste, lack of juice, small size and softness. It may still have a few leaves and even push out some new growth if a (currently rare) rain event occurs. Those little, green glimmers of hope we call leaves have a dark side. First of all, citrus growers don't get paid for leaves but even more chilling is the realization that new leaf growth is a prime attractant for insect pests, specifically the Asian Citrus Psyllid! When a grower has lost his very source of revenue, how can that individual be forced to spend money he or she doesn't have to kill a pest in a grove that will never see viable production again? Florida producers are all too familiar with the harm that comes from an abandoned grove, abandoned by all ***but*** the Asian Citrus Psyllid and the dreaded HLB disease. Abandoned groves were a very significant reason for the spread of HLB in Florida, and we already see the economic realities of a lack of water causing some small and medium sized growers to just cease to farming some groves in California!

Despite the daunting issues that faced us, most citrus growers did well during the 2013–14 production season. A manageable volume of fruit, good eating quality and excellent export demand made for some outstanding net per-acre returns. Some of the trade issues that had plagued us were seemingly resolved and behind us, and there was money to pay for high-priced water! 2014–15 started off with the same promise. The maturity of the crop was early and initial demand overseas and domestically was excellent. In mid-December of last year we began to feel the impact of a slowdown at the west coast ports that were a result of a dispute between the Ports and Union that represented port workers. The slowdown came to a boil in January and February, which just happened to be two of our peak shipping months for exporting fresh citrus to China, Hong Kong, Japan, South Korea, Malaysia, Singapore, etc. If there was a container available, there was no guarantee that the fruit that was shipped wouldn't wind up just sitting in the port container yard or on a partially loaded ship waiting to be fully

stacked with containers before sailing. What normally was a 16 to 234 day voyage from shipping to the receiving port became as many as 60 days. Many loads arrived with very heavy decay losses. (Our Industry continues to work through the arrival claims)

As export shipments dwindled to one-quarter to one-third of what was normal for that time of the season, the domestic market was impinged upon by the extra packed fruit. Consumption of fresh citrus in the U.S., while improving, has remained relatively flat on average over the last decade or so. All that can give way is the price and product movement, and it did. Because of the resulting oversupply and export claims, we expect net grower revenue from the shipper to be on average one-third to one-half of last season's results. Just with Orange Cove-Sanger Citrus Association growers, I estimate **a reduction in revenue of 2.4 million dollars, directly attributable to the slowdown at the west coast ports.**

Again, there is an unfortunate interrelation with effects of the slowdown and the water situation. Water, if it is available, is similar in price to last season, and in some cases more expensive! In any case, there is less water available than last season. Some, larger operations may be able to move water and spread the cost (it's still not good for them, either), but the smaller citrus producer will be hard pressed to live within the means that the current season's returns will provide. In some cases the bulldozers are moving, in other cases citrus farmers are simply hoping against hope that things will turn out better than anticipated.

Some of our key citrus markets are overseas. By virtue of the fact that many of the countries that we ship to are also fruit and citrus producing countries, they seek access to our markets as well and given their cost of production, it might seem like a pretty good deal for the American consumer. In some cases, in order to force the issue, some of our "trading partners" have put up some roadblocks, or at least detours in our trading paths. One country that we have shipped to for years excluded California Citrus for a time, and then after imposing a very specific protocol and program, California fruit was allowed back in. Recently after some shippers had fruit arrive with the fruit condition that initially caused the exclusion, an entire Central Valley county (shippers and growers) were again excluded from the program and will have to re-qualify through pre and post harvest handling treatment protocol procedures and inspections of the fruit. Many of the shippers involved in the secondary exclusion were also victims of the port slow down, which no doubt exacerbated the problem. Again, the dominos of cause and effect falling and the grower suffers the loss. In a different case and a different country (again, a destination that we have again shipped to for years without incident) discovered a pest prompting an expansion of pre and post harvest requirements in order to continue shipping to that specific destination. Certainly, any country has a right to (as we do) exclude pests from their own shores. It must be said however that keeping up with all of the differing protocols and requirements have become very burdensome and expensive. Often, the large scale grower has "people" that handle all of this. The small, individual farmer ***is*** his or her "people".

After hearing all of this it would not be unreasonable to ask the question: "Why would anybody want to continue farming their small operations when they could sell out, take the money and enjoy life?" My wife and I ask ourselves that question often, and we know we're in fine company. Candidly, the same could be asked of many of the larger scale operators. Many have exercised the exit option. If the current trends, threats and challenges go unanswered and unabated, many more will do the same. This would be a tragedy that we shouldn't allow! Less than two percent of the population provides food and fiber for the other 98 percent of the nation. How many more percentage points can we afford to lose?

What can be done for us? How can this Committee help? Farmers by nature are do-it-yourselfers. Specifically, the California Citrus Grower is not interested in a handout and in fact loath the thought of taking something that they were not allowed to produce from the miracle that happens with a new crop every spring and their own hard work. We would ask you to support USDA programs that support the nation's citrus growers, such as the Citrus Health Response Program (CHRP) and Multi-Agency Coordination (MAC) group that promote research and drive real-world solutions to insidious diseases like HLB. Please work to protect growers that seek to export fruit into overseas markets from disasters that occurred as a result of disputes like the West Coast Port Slowdown. (Possibly some tax relief for growers of perishable commodities that were damaged by the afer-effects of the slowdown?)

We ask for your support of Trade Promotion Authority. Without it, critical negotiations with some of our key export markets may well stall. My understanding is that on average, U.S. citrus exports to the countries included in the Trans-Pacific Partnership can currently face tariffs as high as 40%! Given that 35% of California's citrus crop is exported around the world, access to these markets is vital to us! Please create and carry out policies that allow a more practical and balanced application of the Endangered Species Act as it relates to federal water allocations in California. We need legislation that will re-initiate California's development and expansion of its water infrastructure. Relief from burdensome and redundant regulation and reporting also could do much to stimulate the well-being of the small to medium-sized citrus producer. Obviously, while some are, not all of these issues are within the purview of this Committee. That said, I'm sure the Committee Members understand the interaction of all of these stress points. Whether on this Committee, on another Committee or on other legislation, we, the California Citrus Industry, would ask that you consider these factors when contemplating legislation, relief efforts and the cause, effect, short and long-term consequences of such work.

Finally, I should comment on why do we do it? (Aside from insanity!) We love it. Many of us sense that it we are doing what we were created to do. Being connected to the land and producing safe, nutritious and great tasting citrus fruit for a hungry world is a privilege. ***That's*** why we do what we do!

Thank you for the Honor and Privilege of addressing this Committee on behalf of the "average" California Citrus Grower and the Industry we work within.

Respectfully:

Kevin Severns

N. Larry Black, Jr.

Testimony for the

U.S. House of Representatives Committee on Small Business

June 11, 2015

Challenges for Small Florida Growers

Chairman Curbelo and Ranking Member Meng, Good morning, I am Larry Black and I appreciate the opportunity to speak on behalf of the 6,000 Florida Citrus Growers. I am the current President of Florida Citrus Mutual and General Manager of Peace River Packing Company. My family settled in central Florida and began growing citrus in the 1850s. Our company employs 185 Floridians and is the largest employer in the small community of Fort Meade.

The citrus industry is a powerful economic engine contributing $10 billion annually to the Florida's economy and provides 62,000 jobs. The Florida citrus industry covers 515,000 acres and is the largest agriculture crop produced in the state.

The industry is rich in traditions and is truly a way of life for my family and many other multi-generational family farms around the state.

At our industry's peak, just 12 years ago, we produced over 240 million boxes of oranges on just under 800,000 acres of groves. Today, the USDA forecasts we will harvest only 96.4 million boxes of oranges, 60% less than our peak harvest.

Some of the decrease in acreage is due to the development boom and a series of hurricanes in the last decade. The vast majority of the production losses are due to Huanglongbing, known as HLB or citrus greening. HLB is a bacteria that attacks the vascular system of the tree that is spread by an insect vector known as the Asian Citrus Psyllid. Neither HLB nor the Asian Citrus Psyllid are native to Florida or the United States. The psyllid was first detected in Florida in the late 1990's. HLB was first detected in Florida in 2005 and estimates indicate over 90% of the trees in Florida are now infected.

HLB weakens and eventually kills citrus trees. The lower productivity of the trees has forced growers to abandon over 130,000 acres of citrus groves. Growers are learning how to extend the productive life of the infected trees, but production costs have more than doubled due to HLB.

Orange juice prices have increased for consumers because supplies are strained and the cost of production has skyrocketed. Higher prices and competition from other beverages has resulted in U.S. per capita OJ consumption being reduced by 50%. I am confident that consumption trends will reverse as research delivers solutions that will increase yields on our groves and the per-unit cost of production declines.

Growers knew early that HLB was a monumental threat to our industry and a massive research effort began. Citrus growers have taxed themselves and have spent over $90 million over the past 9 years to fund research. The Florida State Legislature has appropriated more than $20 million for the fight against HLB. The 2015 Farm Bill authorized $125 million over five years in citrus research funding through a competitive grant process. On behalf of citrus growers across the country, thank you for recognizing the need for a long term funding source for the research needed to solve the HLB crisis that threatens the citrus industries in Florida, California, and Texas.

Growers are working together to coordinate sprays to control the psyllid that spreads HLB. Antimicrobials and heat therapy appear to be possible near term solutions to improve the productivity and extend the life of our trees. Plant breeders are working to develop varieties of citrus and rootstocks that are tolerant of HLB.

It is apparent a massive replanting of the citrus industry is required in Florida. Economists estimate the Florida industry needs to plant 20 million trees over the next 10 years to reverse the decline and stabilize the Florida industry. Our company has replanted over 350,000 trees over the last three years using the latest technologies available. I am confident we will bring these into production and will be rewarded for the risk we are taking.

The USDA has authorized the Tree Assistance Program, or TAP, to aid small growers with replanting efforts. The TAP program is a cost share program that reimburses a portion of the tree removal and replanting costs for trees lost to disease. Two of the major brands that market Florida orange juice have developed incentive programs to assist growers as they replant.

Florida Citrus Mutual is working with our legislative delegation to look at possible changes to the federal tax code that will attract capital to our industry and aid growers with their replanting efforts.

Under present tax law, citrus growers are required to capitalize the costs of developing a citrus grove for four years, including the year trees are planted. After the trees, labor, fertilizer, spray, and other costs incurred are capitalized for this four years pre-productive period, the new grove is depreciated over a ten year period.

Florida Citrus Mutual proposes to change the tax code to allow growers to immediately expense the grove development and acquisition costs in the year the costs are incurred. The proposal would sunset the tax code changes after ten years. The change would provide an incentive to growers with minimal costs to government.

The citrus industry is a core part of America's agricultural heritage. 62,000 Floridians produce a nutritious product that is part of a healthy diet. The industry is comprised of small family farms and associated businesses. The industry also supports many associated businesses, ranging from vehicle and farm equipment dealers, banks, insurance companies, etc. Our industry has experienced challenges before, most weather related. I am confident our industry will manage through the current crisis and emerge as an even

stronger industry. Again, thank you for your support funding the much needed research. Please consider incentives for growers to replant and other assistance to growing small businesses as they emerge from this crisis.

Thank you.

Testimony of

Dale Murden

President

Texas Citrus Mutual

United States House of Representatives

Committee on Small Business

Subcommittee on Agriculture, Energy and Trade

Washington, D.C.

June 11, 2015

Thank you, Mr. Chairman and members of the Committee. On behalf of the over 400 commercial citrus growers in Texas, I want to express my deep appreciation for convening this hearing today to learn more about the challenges facing the U.S. citrus industry and all our many small, family-owned, growers.

My name is Dale Murden. My family and I currently grow citrus and raise cattle on 250 acres near my hometown of Harlingen, Texas. In addition to being President of Texas Citrus Mutual, I am also a current member of the Board of Directors of the Texas Farm Bureau, Texas Grain Sorghum Association and Delta Lake Irrigation District.

The Texas Citrus Industry is comprised of almost 27,000 acres across a three-county area in the Lower Rio Grande Valley. Together, our growers produce more than 9 million cartons of fresh grapefruit and oranges each year and another 5 million cartons of juice fruit.

Texas is the third largest citrus producing state behind California and Florida. The Texas fresh commercial fruit market is valued at $100 million and the juice market is valued at $8 million. We also have close to 1,000 acres dedicated solely to organic production, which is valued at $5 million. Texas A & M University economists estimate that the total business activity supporting Texas citrus production is almost $200 million annually. I know this pales in comparison to my larger counterparts...but to my fellow growers, it's worth fighting for.

Currently, the industry employs up to 3,000 workers in a normal producing year, which culminates with a harvesting period from October to May.

In my own small operation, my family and I supply all the labor except in extreme cases when weather or pest and disease presence dictate otherwise.

My testimony today will focus on two critical and pressing issues facing growers in the Rio Grande Valley; I will discuss the potential economic devastation due to the invasion of the Mexican Fruit

Fly from south of the border, as well as the rampant spread of Huanglongbing (also known as HLB or Citrus Greening), a disease that is capable of wiping out the entire US citrus production unless we can find a cure.

What sets Texas apart from my colleagues in California and Florida who are also facing many of the same issues is our proximity to Mexico and its porous border and the backyard citrus in our region. USDA has estimated that there are conservatively over 750,000 citrus trees in backyards and private homes Valley-wide. We all love our lemon and lime trees and are very proud we can grow them, but these trees pose a very significant threat to the commercial industry and, when left untreated, provide a safe harbor for fruit flies and the Asian Citrus Psyllid (ACP).

The Mexican fruit fly—or MexFly—is a fly originally found in parts of Mexico and Central America that has now spread beyond the border into the lower Rio Grande Valley of Texas. The MexFly is especially problematic for oranges and grapefruit, which are extremely susceptible to infestation and economic losses resulting from direct damage caused by the larvae that feed on the fruit pulp. Since 1986, Texas has participated in a fruit fly control program headed by USDA-APHIS, culminating in a multi-pronged initiative in 2007 to eradicate the fruit fly from Texas and the Mexican state of Tamaulipas. In 2012 we thought we had successfully eradicated the MexFly but recently—due to continued violence along the Texas-Mexico border, aging USDA rearing facilities and the untreated backyard citrus trees, the MexFly has been found once again in our region.

The MexFly is not just an annoying pest—for hundreds of citrus growers in Texas, a discovery of a MexFly in your grove results in a full government quarantine of the immediate area, which means no fruit can be sold resulting in significant economic loss for the grower. For example, this year proved especially hard for one "pick-your-own" operation after a Mexican fruit fly was found in a neighboring back yard tree. The discovery triggered a quarantine and the growers was no longer able to harvest his crop for the year, leaving thousands of dollars of inventory on the trees with no hope for harvest. The problem is now reaching crisis levels, since January 2014, there have been fruit fly quarantine areas off and on in the **entire** citrus growing region of South Texas.

The best solution we have for combating MexFly is a stronger, more effective sterile fly program run by USDA-APHIS. The agency needs to devote significant resources to upgrading sterile fly production facilities and, perhaps more importantly, they need to provide better management of the existing resources.

While the Mexican fruit fly poses a real and immediate threat, the recent finds of HLB—or citrus greening—has growers of all sizes in south Texas extremely concerned. There is no know cure for this disease and we've learned from our friends in Florida that this disease is deadly serious...and means business.

Greening was first discovered in a Texas grove in January of 2012. Three short years later, we have confirmed that 417 residential trees and 846 commercial trees located in almost 100 groves

valley wide show signs of the disease. And with the extremely long latency period of this disease, it is unclear how many more trees have already been infected.

What this has done to growers in terms of dollars is hard to quantify. When it was first discovered in Texas, we removed not only infected trees, but several of the surrounding trees as well. That translated to lost income, and with no replacement trees to plant, it also equated to a loss of future income as well.

Today, positive HLB finds have become so widespread, that most growers have discontinued tree removal. As such, it has quickly become a numbers game, and a point of diminishing returns that keeps spreading throughout the industry as fast as this disease can infect neighboring trees.

In a desperate attempt to mitigate the effects of HLB, most growers have initiated psyllid spray programs to try to slow the spread of infestation until a cure can be found. This strategy is in addition to our regular care programs and has increased our grove care expenses by almost $400 per acre or 22%. I haven't had a 3% cost of living increase in years, much less 22%.

Even with all of these preventative strategies in place, Texas still has pockets of untreated groves, as well as the backyard trees, that continue to pose a significant threat to the industry. For these reasons, Texas recently created a special entity under the Department of Agriculture to specifically address HLB through a program that is being tailored after the boll weevil eradication program in the state. The industry plans to hold a referendum to assess where we stand on a valley-wide psyllid suppression program, which would impose additional costs on the many growers—large and small—throughout the Valley. Some estimates have projected program costs as high as an additional $80–$100 per acre.

Federal investments in HLB research and ACP eradication programs are critical to the survivability of the citrus industry in the U.S., as such, we have requested full funding under two high priority citrus programs: the Citrus Health Response Program (CHRP) and the Huanglongbing Multi-Agency Coordination (MAC).

The Citrus Health Response Program is a critical source of funding for the exclusion and eradication activities associated with the Asian Citrus Psyllid. The funds have been used in partnership with other state agriculture departments and citrus industry groups to research, survey and combat both the pest and disease.

The Huanglongbing Multi-Agency Coordination was started in 2014 when Congress authorized funding to develop solutions for the control and eradication of ACP and HLB. It is vital that this current funding be continued to ensure scarce federal, state and industry funds are allocated to those projects with the highest likelihood of developing a cure for this devastating disease without unnecessary setbacks or duplication of efforts.

I'd like to thank you for attention today on these dire issues. In short, the United States citrus industry as you know it, is in extreme trouble. We are fighting to preserve our very way of life and are doing everything in our power to prevent total eradication of

an essential U.S. industry. With agency collaboration and much needed support, it is our hope that we will soon be able to eradicate ACP and HLB from our vocabulary entirely.

Thank you again, Mr. Chairman, for holding this important hearing and for all that you and the Committee are doing. We look forward to working with you in the future.

Squeezed: Current Challenges for Small Citrus Operations

Hearing

June 11, 2015

Subcommittee on Agriculture, Energy and Trade

U.S. House of Representatives

Statement of Dr. Michael E. Rogers [1]

Interim Director and Associate Professor, Citrus Research and Education Center,

Institute of Food and Agricultural Sciences,

University of Florida,

700 Experiment Station Road, Lake Alfred, FL

Chairman Curbelo, Ranking Member Meng, and members of the subcommittee, thank you for the opportunity to speak to you today about citrus greening, the impact this disease is having on citrus production, and the prospects for potential research-based solutions.

My name is Michael Rogers and I am an associate professor of entomology at the University of Florida where I serve as interim director of the Citrus Research and Education Center (CREC) near Orlando, the largest research center in the world dedicated to one crop, Citrus! The mission of the CREC is *"...to discover and deliver innovative solutions that empower citrus and other agricultural interests to conduct responsible and profitable business. CREC fosters scientific excellence and efficient use of resources."* With that charge, scientists from CREC and throughout UF/IFAS, along with researchers from other citrus producing states and countries, are collaborating to solve the most devastating disease of citrus worldwide, citrus greening disease.

Also referred to by its Chinese name Huanglongbind (HLB), citrus greening was first documented in Asian countries in the late 1800's. Prior to the discovery of citrus greening in Florida in 2005, very little was known about this disease and that lack of knowledge made commercial citrus production economically unfeasible in those countries where the disease was present. In the absence of citrus greening disease, the state of Florida and the country of Brazil were the global leaders in orange juice production.

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Citrus greening disease is caused by a bacterium that is spread tree-to-tree by an insect known as the Asian citrus psyllid. When a psyllid carrying the bacteria feeds on a citrus tree, it "injects" the disease-causing bacteria into the vascular system of the plant. The bacteria then move throughout the plant, increasing in number, over time destroying the vascular system in both the above ground parts of the tree and the below ground root system that supports overall tree health. As the vascular system is weakened, the health of the tree begins to decline with the trees dying a slow death. Long before the trees completely succumb to the disease, citrus fruit production is severely impacted. Much of the fruit on diseased trees is reduced in size and quality, making them unusable for processing for orange juice or for sale as fresh fruit. After a tree has been infected for several years, the continued deterioration of the root system results in trees being unable to hold most of their fruit load and the potentially harvestable fruit that growers have spend thousands of dollars per acre growing, drops to the ground just before its ready to be picked. Currently, this is the situation for the majority of the mature fruit-bearing citrus groves in Florida. As a direct result of greening disease, the 2015 all orange harvest is predicted to be 96.4 million boxes of fruit[2]. This is down from 240 million in 2003 and is the smallest Florida orange crop since 1966.

When citrus greening disease was first found in Florida in 2005, management programs were adopted by growers to slow the spread of the disease until a sustainable long-term solution could be developed. The approach implemented to manage greening included use of insecticides to control the insect which spreads the disease, removing infected trees from groves because they served as a source for continued spread of the bacteria, and where trees were removed, replanting with trees grown in certified disease-free nurseries. Adoption of these practices increased the production costs for Florida citrus growers from $800 per acre to more than $2,000 per acre.

By August 2008, citrus greening disease was confirmed to be present in every county located within the primary citrus growing region of Florida. Since that time, the disease has spread to very commercial citrus grove in the state, infecting most, if not all, of the fruit-bearing trees at present. One of the difficulties in managing this disease is the fact that it can take several years from the time a tree is infected until visible symptoms are apparent. It's likely that much of the disease found by 2008 occurred before citrus greening was confirmed to be present in Florida and any management programs were implemented.

Now that most of the citrus trees in Florida have greening disease, growers have made changes to their management programs in attempts to remain in business as long as possible. Removal of diseased trees is no longer a viable option in most situations. Instead, growers are attempting to maintain the health of these infected trees using improved fertilization programs. These improved

[2] Citrus Forecast (May 2015), USDA-National Agricultural Statistics Service. *http://www.nass.usda.gov/Statistics_by_State/Florida/Publications/Citrus/cit/2014-15/cit0515.pdf*

fertilization programs appear at best to only slow the rate of tree death, but do little to prevent fruit drop prior to harvest.

Since the discovery of greening in Florida ten years ago, all citrus research programs in Florida, along with citrus researchers from other states and countries, have shifted their emphasis to finding a solution to citrus greening disease. Important research-based advances have been made that have provided growers with the tools needed to slow the rate of spread of this disease and remain in business to date. These advances include improved efficacy and cost-effectiveness of psyllid management programs, and improvements in tree care through adjustments made to plant nutritional and root health programs. However, simply put, these improvements are just a bandage on a gaping wound. They won't solve the problem, but instead serve to slow the bleeding.

One question I am constantly asked is "Why is it taking so long to find a solution to greening?" The reason is this is a very tough disease to work with. Our research began with minimal accurate information on this disease. This is complicated by the fact that the bacterium that causes the disease had not and has still not been grown in culture in the laboratory to date. The inability to grow the bacteria in the lab greatly limits the research that can be done to find a cure. Furthermore, a thorough understanding of how the disease develops, from start to finish, is required to develop "the cure." In the case of citrus greening, this is a disease of a perennial crop that takes years to progress through the disease cycle. Compared to an annual crop such as wheat or corn where you can study a complete disease cycle in a matter of months, studying the disease cycle in a citrus tree takes years. This increases the time to get results and requires lots of funding.

Despite these challenges, scientists have made tremendous advances in our understanding and management of this disease. We have learned more in the past 10 years than in the previous 100+ years this disease has been present in other countries. It should be acknowledged that the Florida citrus growers deserve the credit for these accomplishments that would not have been possible without the $90+ million in research funds they provided over the past 10 years through self-imposed taxes on their production.

The most important scientific breakthroughs that hold promise for developing a long term solution to greening disease are molecular based. The genomes of the psyllid, the greening bacterium, and citrus itself have all been sequenced. With this information in hand, researchers are now able to target specific genes required for survival of both the insect and the disease-causing bacterium. For example, researchers have used such approaches to successfully control psyllids by interfering with their ability to fly and feed on plants, thus preventing the insect's ability to spread the disease. Genes have also been identified that could potentially provide resistance to the disease-causing bacteria. Citrus trees with these genes for resistance are being tested in field trials and the results to date looking promising.

While there are many potential research solutions being developed that hold promise, putting that ultimate answer in the hand

of growers is still years away. If we had a citrus tree today that we knew for certain was resistant to this disease, it would take 2–3 years to scale-up commercial nursery production of that resistant tree for purchase by growers. If the resistant plant happens to be a GMO, the regulatory red tape adds even more time to make that a reality. Once a grower is able to plant trees resistant to the disease, it will take at least 4 years for those trees to being producing a harvestable crop, and additional years beyond that time to recover the costs required grow the trees to that plant. This is a discouraging prospect, especially for the small citrus grower who is currently struggling to stay in business.

However, research that has been conducted since greening arrived in Florida is now providing exciting new potential solutions for living with this disease in the short term while work continues on the potential long-term solutions that hold promise. Through the efforts of plant breeders at the CREC and the USDA, new citrus rootstocks and scions (hereafter in this testimony referred to collectively as varieties) have been developed that appear to be tolerant to citrus greening disease. These plants are described as tolerant because while they may become infected with the greening bacterium, field studies have shown they will survive and produce fruit for a longer period of time in the presence of greening compared to varieties previously grown in Florida. To date, 18 of these potentially tolerant varieties have been made commercially available for growers to use in replanting their groves.

Should those replanted trees become infected with greening, a new approach to rehabilitate diseased trees has been developed. Known as thermal therapy [3], researchers at the CREC have designed machines to rapidly cover trees in the field and apply steam to kill the bacterium in the above ground parts tree. While the steam treatment does not completely cure the disease, it extends the life of trees, buying additional years of positive crop yields for the grower.

Progress has been made developing other tools that could soon be used in the near-term for managing greening disease. Examples include the development of compounds that can be applied to the threes to kill the bacteria in the plant. Numerous bactericidal compounds have been screened in laboratory and greenhouse trials. The most promising candidate compounds are now being tested in field trials as possible tools that can be used by growers to reduce or eliminate the effects of the disease.

As previously mentioned, the majority of fruit bearing trees that are providing income to Florida growers are infected with citrus greening disease and have been for a number of years. As diseased trees are removed, growers must replant new trees in their groves to maintain continuity of production until better solutions are developed. The availability of tolerant varieties, thermal therapy, and other short term solutions under development will play an important role in providing that needed continuity of production. For the grower, time is not on their side. Growers are in desperate need of assistance to maintain their operations. Citrus research programs

[3] http://bit.ly/citrussteaming

are also being negatively affected by the reduction in fruit yields. The research funds provided by the self-imposed grower tax are drying up, thus threatening to impede the progress of the promising research that must be continued to provide solutions for this disease.

Fortunately, the availability of new federal research funds, specifically the USDA-SCRI and USDA-APHIS-MAC programs, are providing additional support for research on citrus greening. A sincere thank you to those who helped provide this needed funding through the Farm Bill. A large majority of the funding provided this past year went to support research projects at the CREC. While these funds will provide needed support for some very promising research projects, there are still gaps in funding that exist for many promising areas of research previously funded by the citrus grower generated tax.

Your financial support for further research is crucial for the future of citrus growers not only in Florida, but throughout the entire county. Land-grant universities in every state are dedicated to serving the public, and federal research dollars are crucial for universities to continue their research to benefit economic development.

I appreciate the opportunity to address the committee and bring to your attention these important issues facing the citrus industry. I extend an invitation to any of the members who are interested, to please contact me to arrange a visit to the CREC to witness first hand the effects of this disease and the research underway to develop solutions to this problem.

That concludes my formal statement and I am happy to answer any questions you may have.

Thank you.